1.1 Environmental Issues (Amended)

The following environmental specifications apply to all Categories included in this RFR. For those Bidders responding in more than one category, any response that does not apply to all categories must be "flagged" to clearly indicate the Category number(s) to which it applies. Bidders must indicate such responses by including the words "Specific to Category # [insert applicable Category number here! Only" next to each such response.

1.1.1 Environmental Commitment

It is the policy of the Commonwealth of Massachusetts to encourage eligible contract users to procure products and services which help to minimize the environmental impact resulting from the use and disposal of these products. Computers and other electronics are a growing focus of environmentally preferable purchasing activities due to their high prominence in the waste stream, their numerous hazardous chemical constituents, and their significant energy use. The billions of dollars required to properly dispose of this electronic waste will almost entirely come from state and local governments' budgets. Moreover, when these products are improperly disposed of, they can release heavy metals and other hazardous substances that contaminate groundwater and pollute the air.

The primary environmental objective of this RFR is to procure equipment, which uses fewer resources including energy, over time, thus decreasing pollution and energy costs and represents a reduced negative effect on human health and the environment. Such equipment must also meet price and performance requirements of the Commonwealth.

I.1.2 Mandatory
Environmental
Requirements

1.1.2.1 Energy Star Technology Equipment and Guidelines

It is mandatory that Bidders offer IT Equipment which, where applicable, meets the most recent set of U.S. Environmental Protection Agency's and Department of Energy's ENERGY STAR guidelines and have the ENERGY STAR label or substitute affixed to any equipment covered by such guidelines (http://www.energystar.gov/).

Installation, service and any other technical support performed under any contract resulting from this RFR must, where applicable, include the proper configuration of power management features according to the current EnergyStar specifications for that class of equipment at the time of installation, service or any other technical support.

Personnel involved in system integration, site customization, equipment maintenance and technical support must:

- Ensure that power management features on all equipment and duplexing features on all networked printing devices remain installed and functional at all times.
- Carry out their services so as to maximize the energy efficiency of the installed product.
- Treat the malfunction of power management or duplexing features as functional failures of the equipment, and must diagnose and repair those problems rather than disable the power management features.

For all equipment with Energy Star power management features, all Energy Star power management features must be fully activated upon delivery. In addition, Awarded Contractors must provide the following detailed set-up specifications to customers:

• Equipment shall be configured so it automatically enters a low-power mode after a period of inactivity.

- When a computer in a low-power mode is used again, it automatically returns to active mode.
- For computers that will be used in networked environments, provide CPU's and monitors that are set up to sleep on networks and respond to wake events.
- Provide training, assistance materials (if requested) and customer support on the power management features so that these features remain properly activated.

1.1.2.2 Training on Energy Star Features and Recycling

Any equipment-related training performed under any contract resulting from this RFR (e.g. upon installation of new equipment) must include information on the use and benefits of EnergyStar power management features as well as information on the proper recycling and/or reuse of used equipment.

Awarded Contractors must submit samples of any such training materials to the PMT within ninety (90) days following the award.

1.1.2.3 Recycling of Packaging Materials

After equipment delivery, Contractors must agree to work with their customers wherever feasible, to recycle all corrugated cardboard packaging. To comply with this requirement OEMs and/or Contractors should examine one or more of the following:

- Utilize the Eligible Entity's existing recycling program,
- Make arrangements with the seller of the equipment for packaging recycling,
- Utilize the services of a recycling company.

The services of a recycling company can be obtained through the Statewide Contract #ST1J391 or its replacement. Such services can also be obtained by searching for and contacting a business listed in the Recycling Services Directory for Massachusetts (RSD) available at http://www.wastecap.org/. RSD lists companies that accept, collect, or purchase materials for recycling and reuse from Massachusetts businesses, communities, or individuals. This free resource is compiled and produced by WasteCap of Massachusetts and funded by the Massachusetts Department of Environmental Protection (DEP).

1.1.2.4 Reporting

If requested by the PMT or contract manager, Contractors **must** report on compliance with the environmental specifications as well as information on the proper recycling and/or reuse of used equipment. Reasonable notice will be given prior to the due date of such reports.

Contractors must also submit periodic reports (e.g. annual, dher) concerning purchases of equipment from this contract for all contract users as may be requested by the PMT or other eligible entity.

1.1.2.5 Ongoing Environmental Initiatives

Awarded Contractors must agree to work with the PMT and interested environmental partners during the term of the contract to:

- Examine the feasibility of implementing environmental initiatives that minimize their environmental impacts at manufacturing, assembly, warehouse, distribution and/or other facilities, including, but not limited to:
 - toxic use reduction and/or waste prevention efforts
 - recycling and/or reuse (including the current recycling, reuse and/or remanufacture of computer equipment by or for Bidder)
 - energy efficiency
 - natural resource conservation

Support future efforts aimed at improving the environmental design and performance
of electronics in the marketplace. Such programs may include, but not be limited to,
incorporating any upcoming Energy Star specifications into equipment design and
meeting certification standards established by the Electronic Products Environmental
Assessment Tool (EPEAT), a current project underway with funding provided by the
US EPA. See details at http://www.epeat.net/.

1.1.3 Desirable
Environmental
Specifications (OEMs
Only – Categories 2-5
and 7) Amended

Awarded Contractors must read the desirables section below and provide the narrative requested on the environmental aspects of their equipment to the greatest extent possible. Points will be allocated in the RFR evaluation process based on the information outlined in the narrative.

1.1.3.1 Draft Principles - Background and Directions for Responding

The following are Draft Principles developed by a national coalition currently coordinated by the Center for a New America Dream (http://www.newdream.org/) for the purpose of establishing common environmental specifications for the IT industry. We list the principles here in order to demonstrate the Commonwealth's commitment to these efforts and to encourage OEMs to work diligently toward compliance with these standards. The use of this Draft document does not constitute an endorsement by anyone other than the Commonwealth of Massachusetts at this time.

Bidders should read the Principles carefully, as well as the other environmental criteria indicated in the RFR, and provide a narrative (one or more page text) with their Response that outlines a description of how one or more of their models meet the criteria for equipment design and handling processes.

It is desirable that Bidders address as many details within Principles as possible in this narrative. Points will be allocated based on the extent to which Bidders can demonstrate their current compliance with these criteria or how these criteria will be met in the future. Bidders will be evaluated on the specific details included, the level of supporting documentation provided, and the overall comprehensiveness of the narrative. In situations where certifications and/or declarations have been obtained (e.g. third party certifications, ECO declaration and other) Bidders may just submit copies of such certifications and are not required to include an additional description in the narrative.

The PMT reserves the right to request clarification from Bidders concerning these criteria and information submitted.

Response Required: Use Attachment A, Response Form for all Categories. Include any attachments and/or certifications in the location specified in the Checklist found in Attachment A.

1.1.3.2 Recycling of Packaging Materials (Amended)

After equipment delivery, Contractors must agree to work with their customers wherever feasible, to recycle all corrugated cardboard packaging. To comply with this requirement OEMs and/or Contractors should examine one or more of the following:

- Utilize the Eligible Entity's existing recycling program,
- Make arrangements with the seller of the equipment for packaging recycling,
- Utilize the services of a recycling company.

The services of a recycling company (third option) can be obtained by searching for and contacting a business listed in the Recycling Services Directory for Massachusetts (RSD) available at www.wastecap.org. RSD lists companies that accept, collect, or purchase

materials for recycling and reuse from Massachusetts businesses, communities, or individuals. This free resource is compiled and produced by WasteCap of Massachusetts and funded by the Massachusetts Department of Environmental Protection (DEP).

It is desirable that bidders develop a procedure or program for recycling packaging materials, which may utilize one or more of the options above. It is desirable that such procedure or program be offered to the Eligible Entity at no cost. If such no-cost procedure or program utilizes an Eligible Entity's existing recycling program, the ITC16 Contractor must reimburse the Eligible Entity for any cost associated with recycling the packaging.

Bidders must provide a description of the procedure or program for the recycling of packaging materials in their responses. Such description must include information on which of the options and/or specific service providers will be utilized and on any costs for the Eligible Entities associated with the use of such recycling procedure/program offered by Contractors. Points will be allocated in the RFR evaluation process based on the information about such procedure/program.

Response Required: Attach procedure/program description as the last page of your response. Enter your company's name at the top of the page and on any continuation pages.

1.1.3.2.1 Design for Environment and Human Health

1.1.3.2.1.1 Elimination or reduction of harmful constituents

Eliminate or reduce hazardous, carcinogenic, mutagenic and ozone-depleting constituents in computers, monitors, and peripherals including, but not limited to, cadmium, chlorinated plastics, halogenated flame retardants, hexavalent chromium, lead, mercury, and ozone-depleting substances (such as those included in the A, B, and C annexes of the Montreal Protocol on Substances that Deplete the Ozone Layer - see

http://www.unep.org/ozone/pdf/Montreal-Protocol2000.pdf).

Response Required: See Section 4.4.3.1 above.

1.1.3.2.1.2 Use of recycled and bio-based materials

Use the greatest amount feasible of recycled and bio-based materials, particularly in plastics in monitor and CPU housings, and/or remanufactured/reused parts.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.1.3 Facilitate recycling

Facilitate the recycling of individual components and the full product including, but not limited to, avoiding glues and welded connections, using clearly labeled plastics, using universal fasteners (screws, snaps, etc.), using single resin plastics, and separating toxic components.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.1.4 Facilitate Upgradeability

Facilitate upgradeability including, but not limited to, modular design, expandable memory, owner transferability, and other features that extend the product life and simplify continued use beyond the original owner.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.1.5 Packaging and shipping material

Use packaging and shipping material that contains recycled and bio-based materials, are reusable or recyclable in the geographic region where the product is sold, have been reduced, and are collected by the vendor for reuse and/or recycling.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.2 Promote Energy Efficiency and User Health

1.1.3.2.2.1 Energy Star compliance

Meet the most up-to-date *Energy Star* specifications, are shipped with all specified power management features enabled, and include all necessary information and technical support to ensure that equipment users can easily and simply install and maintain power management features on their equipment. (See ITC16 Mandatory Environmental Specifications)

*Response Required: See Section 4.4.3.1 above.

1.1.3.2.2.2 Minimize Health Risk

Minimize health risks to users including, but not limited to, ergonomic design, reduced electromagnetic noise, and other emissions.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.3 Ensure Safe and Environmentally-Sound End-of-Life Management

1.1.3.2.3.1 Take-back and Management Services

Provide take-back and management services that ensure that computers, monitors, and peripherals are reused (preferable) and/or recycled to the greatest extent feasible in a way that minimizes harm to the environment and human health. Toxic elements should be removed before any disposal or incineration takes place. Hazardous waste must not be sent to developing countries.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.3.2 Worker Protection

Meet high standards of worker protection in both the United States and overseas. This includes employment practices that protect workers from hazardous exposures and that enable employees to take action to protect their own health.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.4 Manufacturer Responsibility

Additionally, we believe that all those involved with the manufacture of computers, monitors, and peripherals should be working diligently to improve the environmental performance and protect public and worker health beyond the above criteria. As such, it is highly desirable that manufacturers meet the following corporate responsibility goals:

1.1.3.2.4.1 Compliance with regulations and practice pollution prevention techniques

Comply with all applicable environmental regulations and practice pollution prevention techniques that reduce waste and conserve energy and water.

Response Required: See Section 4.4.3.1 above.

1.1.3.2.4.2 ECO Labels and Third Party Certifications

Obtain credible eco-labels and third party certifications, such as (but not limited to) TCO (http://www.tcodevelopment.com/), Blue Angel (http://www.blueangeltech.com/), ISO 14001, and an ECO declaration published in accordance with IT ECO

(http://www.svtc.org/cleancc/greendesign/index.html) or ECMA TR/70 (http://www.ecma-international.org/publications/techreports/E-TR-070.htm).

Response Required: See Section 4.4.3.1 above.

1.1.3.2.4.3 Toxic Materials

Disclose the use of toxic materials on the OSPAR List of Chemicals for Priority Action http://www.ospar.org/eng/html/welcome.html and/or the Proposition 65 List at http://www.oehha.ca.gov/prop65/prop65 list/Newlist.html in computers, monitors, and peripherals.

Response Required: See Section 4.4.3.1 above.

1.1.3.3 Additional Provisions for End of Life Management (Amended)

In addition to the End-of-Life management provisions which are part of the "Draft Principles" above, it is desirable that:

- Bidders provide take back programs that comply with the requirements established in the Electronic Recyclers Pledge http://www.svtc.org/cleancc/recycle/recycler_pledge.htm.
- Recycling will be handled by one of the statewide contractors awarded on Contract #
 FAC26, or its replacement, or by a responsible recycling operation with an environmental
 management system in place. It is also desirable that the cost of recycling be borne
 by the Bidder.
- Recycling also complies with the European Union's WEEE Directive
- (http://europa.eu.int/eur-lex/pri/en/oj/dat/2003/l 037/l 03720030213en00240038.pdf), which requires manufacturers to recycle or reuse more than half of their old equipment on the market by 2006.
- Bidders propose methods that will allow for the return of used equipment to the original manufacturer or 3^d party entity for reuse or recycling, preferably at **no cost** to contract users. Any unreasonable costs for this service will result in no points for this section, even if take back methods are submitted. Such take-back methods may include but are not limited to:
 - one-for-one exchange of equipment offered by, or previously purchased from the Bidder, upon purchase of new equipment from said Bidder
 - collection of any used computer equipment by Bidder or sub-contractor for reuse or recycling, preferably including provisions to continue recycling operations should a sub-contractor no longer be able to perform such activities
 - coupon system for pre-paid take-back at permanent collection centers, such as, but not limited to, Goodwill Industries, Salvation Army, and Universities.

If take-back provisions are proposed, agencies must follow applicable laws, procedures and guidelines relating to disposing of equipment prior to invoking disposal procedures.

Response Required: Respond using Attachment A, Response Form for all Categories.